

Original Research

Determinants of Agency Costs: Evidence from Non-Bank Financial Institutions of Bangladesh

Raihan Sobhan¹ 

Department of Accounting and Information Systems, University of Dhaka,
Dhaka, Bangladesh

Muntaqim Chowdhury

Department of Business Administration, University of Asia Pacific, Dhaka,
Bangladesh

Abstract

The main purpose of the research is to determine the factors that influence agency costs in listed non-bank financial institutions of Bangladesh. The following eight factors have been considered in this study: board size, percentage of independent directors, and percentage of female directors under board characteristics; percentage of managerial ownership, institutional ownership, and foreign ownership under ownership structure; and leverage and firm size under firm characteristics. To measure agency costs, the asset utilization ratio (AUR) and expense ratio (ER) have been used as proxies. The regression results demonstrate that board size, institutional ownership and leverage are all inversely and significantly associated to agency costs, but managerial ownership has a significant and positive relationship. On the other hand, no significant relationship has been found among the percentage of independent directors, female directors and firm size with agency costs. However, the nature of the relationship between the percentage of foreign ownership and agency costs could not be generalized. The findings of this study will assist financial institution executives in Bangladesh in understanding the existing factors that influence agency costs and will help them in reducing agency costs by identifying and addressing the causes.

Keywords: Agency Costs; Corporate Governance; Ownership Structure; Firm Characteristics; Non-Bank Financial Institutions.

JEL Classification Numbers: G23, G34, M14

¹ Corresponding author's Email: raihanfahim001@gmail.com

Introduction

Agency cost is a crucial factor for any company. It is one of the most major obstacles to a company's wealth and profit maximization goals. Due to conflicting interests of shareholders (principals) and the management team (agents), internal costs incur. These costs associated with settling this issue and managing the relationship are known as agency costs. It has now become a concern for the companies to increase their efficiency by reducing agency costs. Agency costs are determined by a variety of factors that differ by country. To keep agency costs under control, effective corporate governance should be implemented. The set of guidelines, policies and processes used to govern and operate a firm is referred to as corporate governance.

According to Sehrawat et al. (2019), strong corporate governance procedures may help in controlling management-shareholder conflict. Monks & Minow (2009) also stated that effective corporate governance represents well-structured management practices, rules, legislations and cultures that assist businesses in keeping control over their activities. It focuses on shareholders' rights and minimizes the diversion of their interests. Core et al. (1997) claimed that firms with a poor corporate governance framework are more likely to experience a higher level of agency cost, in which powerful management teams might commit acts that are unfavorable to shareholders' interests to attain their interest.

Like most developing countries, Bangladesh has poor corporate governance in existing organizations due to several common constraints including a lack of effective law enforcement, misuse of investors' rights, absence of commitment of board members, failure to comply with the regulatory system, poor implementation and monitoring systems, and a lack of disclosure of information and transparency, all of which can result in corruption, ignorance, dishonesty, and a lack of answerability. Analyzing the board characteristics, ownership structure and firm characteristics, the study attempted to figure out the key characteristics that determine the agency costs of the companies belonging to the financial institution industry of Bangladesh. The outcomes of the study will be beneficial to financial institution administrators in making decisions, as well as future researchers.

The primary objective of this study is to identify the factors that influence agency costs in listed non-bank financial institutions in Bangladesh. In order to achieve the primary objective, the following secondary objectives are set:

- To find out the relationship between board characteristics and agency costs
- To determine the relationship between ownership structure and agency costs
- To identify the relationship between firm characteristics and agency costs

In the context of Bangladesh, just a few studies on agency costs have been conducted. Despite the fact that agency costs play a critical role in a firm's performance, no major

research has been conducted to uncover the factors that influence the agency costs of financial institutions in Bangladesh. Furthermore, the majority of previous research has concentrated on the banking industry rather than the Non-Bank Financial Institutions (NBFI's). As a result, there is a significant gap in the literature, which prompted the authors to carry out research on this topic.

The remaining sections of the paper are organized as follows: Section 2 shows the literature review and hypotheses development. Section 3 is the description of the research methodology and section 4 discusses the findings of the study. And at last, Section 5 draws a conclusion to the study and makes some recommendations based on the analyses.

Literature Review and Hypotheses Development

Board Size

The bigger the size of the board, the lower the agency costs as a larger board has more expertise and monitoring capability. Larger organizations have higher agency costs but larger boards can reduce agency costs by providing stronger monitoring, enhancing board independence, and counteracting managerial entrenchment, resulting in improved firm performance (Fauzi & Locke, 2012). According to Junwei et al. (2011) and (Florackis, 2008), a large board is usually more effective than a small board and delivers better results. When the board size is larger, agency expenses are lower. In their research, Nguyen et al. (2020) discovered that Vietnamese listed firms with larger boards of directors may have lower agency costs and the reason for this is that the management team tends to dominate and manipulate the small board of directors. As a result, larger boards, which have more time and experience to devote to the company, are considered to be better at monitoring operations.

In contrast, the bigger the size of the board, the higher the agency costs. A larger board size leads to problems in cooperation as members have different views, which leads to higher agency costs. Junwei et al. (2011) found that board size is indistinctly connected with asset turnover; additionally, they argue that firms with larger board sizes have greater agency costs. Furthermore, companies with smaller boards have lower agency costs (Aziz et al., 2015; Garanina & Kaikova, 2016). The majority of research in the United Kingdom and the United States, revealed a negative association between board size and firm performance, meaning that companies with larger boards have greater agency costs (Nguyen et al., 2020). Čalopa et al. (2020) claimed that when the board size is smaller, agency costs are lower because larger boards are less effective. The majority of prior research in the United States found a negative correlation between board size and business performance. It means that in the United States, the smaller the board of directors, the better the company's performance, which helps to eliminate agency issues (Cheng et al., 2008; Coles et al., 2008). McKnight & Weir (2009) argued that larger boards are ineffective due to the lack of coordination and free-rider problems. The following hypotheses can be derived based on the above discussion:

Hypothesis 1 (H1):

- (A) There is a positive relationship between board size and agency costs.

(B) There is a negative relationship between board size and agency costs.

Independent Directors

Being an outsider, an independent director provides greater supervision and ensures transparency on the board, which in turn boosts the firm performance by reducing agency costs. Boards with a significant portion of independent directors can reduce the exercise of managerial discretion because boards dominated by external directors are more likely to act effectively in shareholders' interests in order to protect their reputation in front of shareholders (McKnight & Weir, 2009; Henry, 2004). Bathala & Rao (1995) claimed that board independence, as represented by outside independent directors who have no substantial stake in the company, may enhance the board's controlling function. In an attempt to address the agency conflict between management and shareholders, outside directors often serve essential monitoring functions. The majority of prior publications in Vietnam have likewise indicated that board independence improves firm performance, and we anticipate that this may lead to reduced agency costs with such effective independent directors (Vo & Nguyen, 2014).

In sharp contrast, Nguyen et al. (2020) found that board independence and agency costs have a positive relationship. Nguyen et al. (2017) also support the positive relationship between board independence and firm performance. Due to the lack of expertise, independent directors may fail to complete their monitoring function in governance, which may result in a greater agency problem and poorer firm performance.

Hypothesis 2 (H2): There is a negative relationship between the proportions of independent directors in the board and agency costs.

Female Directors

Several studies have shown that the female directors on a board monitor robustly and analyze the decisions thoroughly, leading to a better firm performance, decreasing conflicts with the agents. Evidence shows that having female directors on company boards reduces agency costs (Ain et al., 2020). Additionally, boards with a diverse gender composition perform better at state-owned companies (SOEs), where agency problems are more frequent. Female directors are also better at monitoring in more developed areas. Garanina & Kaikova (2016) found that a larger proportion of female board members improves the efficiency of asset usage in the company and, as a result, reduces agency costs to a limited extent. In their analysis of US data, Adams & Ferreira (2009) discovered that female board directors lessen agency disputes since they are always supervised on the board top, as opposed to their male counterparts. Carter et al. (2003) used agency theory to look at board diversity and firm value and discovered a substantial negative correlation between the proportion of women on a board and firm agency costs for Fortune 100 companies. They claimed that gender diversity can improve the monitoring and controlling of managers while enhancing board directors' independence. This could be because female board members are more likely to ask questions that male board members would not. Some other studies have also examined the relationship between board composition and agency costs focusing on highly developed capital markets, like

the US and the UK, and found that gender diversity reduces agency costs (Francoeur et al., 2008; Jurkus et al., 2011).

Conversely, some studies found that the participation of female directors on boards also has a negative impact. Gender diversity on board enhances agency conflict while reducing the firm financial performance (Wellalage & Locke, 2013). Pletzer et al. (2015) stated that women board directors have an adverse effect on company performance by increasing the number of conflicts, increasing collaboration needs, and degrading communication quality.

Hypothesis 3 (H3): There is a negative relationship between the proportions of female directors on the board and agency costs.

Managerial Ownership

In general, managerial ownership reduces agency costs since their interests are aligned with those of shareholders. Analyzing service listed companies in the Chinese Securities Exchange, Vijayakumaran (2019) found that when a reasonable percentage of shares are owned by management teams, the interest of the two groups can be aligned, because higher shareholding from the managers means that their wealth and incentives are more aligned with the interests of the company owners, which alleviates moral hazard issues. It stated that there has been a sharp increase in management ownership in China over this time period in order to lessen shareholder and management disputes. The paper stated that the higher management ownership represented good corporate governance, hence eliminating agency costs. According to Ang et al. (2000) and McKnight & Weir (2009), agency costs are negatively correlated to managerial ownership share in the US and UK economies. Jensen & Meckling (1976) also claimed that as insider ownership increases, agency costs will decrease.

In contrast, Nguyen et al. (2020) stated that there is a positive relationship between management ownership and agency costs in the context of Vietnam. The more shares that managers own, the more power they have and the more likely they are to use their position to steer the company in a direction that benefits them. They have the ability to abuse their power by appointing relatives to important management positions, thereby establishing their own group of interests and this self-interest is the cause of this shareholders' conflict.

Hypothesis 4 (H4): There is a negative relationship between management ownership and agency costs.

Institutional Ownership

In resolving the agency problem institutional shareholders play a critical role since they monitor management activities and influence their decision making. As shown by Crutchley et al. (1999), institutional ownership reduces agency costs by minimizing conflicts. In recent years, many institutions have become active monitors, and management considers outside monitoring as a replacement for internal monitoring devices like debt, dividends, and insider ownership. According to Brickley et al. (1997), institutional shareholders are more capable and motivated than individual shareholders to

serve as controllers and monitors in the company, lowering agency costs. In addition, Henry (2004) demonstrated that the higher the institutional shareholdings the lower the agency costs. Gul et al. (2012) also concluded that higher institutional shareholding will reduce agency costs as institutional ownership has a considerable positive impact on asset utilization ratio. Institutional investors supervise the firm's decision-making and performance; effective monitoring matches shareholders' interests with those of the owners and reduce agency costs.

Hypothesis 5 (H5): There is a negative relationship between institutional ownership and agency costs.

Foreign Ownership

Foreign ownership has a significant impact on the agency costs of a firm. Foreign investors provide the firm with better monitoring which results in reduced agency costs. According to Lu & Li (2019) and Vijayakumaran (2019), foreign investors, with their skills and practical business knowledge, contribute significantly to properly monitoring and effectively managing discretions in emerging economies. The relationship between foreign ownership and agency costs is negative. In Vietnamese listed firms, foreign investors thus serve as an effective controller to minimize agency costs (Nguyen et al., 2020). According to Xu & Wang (1999), Chinese companies with a higher number of foreign investors have stronger managerial control, which leads to higher firm performance and reduced agency costs.

Hypothesis 6 (H6): There is a negative relationship between foreign ownership and agency costs.

Leverage

The amount of debt a company utilizes to finance assets is referred to as leverage. The higher the leverage of the company the lower the agency costs are because the lenders are concerned about the firm and actively monitor the firm. Ang et al. (2000) showed that agency costs actually reduce when the control of creditors increases. It implies that there is an inverse relationship between debt to asset ratio and agency cost. As the level of debt rises, managers seek the best possible outcome and thus agency problems reduce. This result is also consistent with the study of Nguyen et al. (2020). Furthermore, according to Garanina & Kaikova (2016), firms with a higher level of debt are more closely monitored by creditors, leading to lower agency costs. Vijayakumaran (2019) also stated that companies with higher debt financing showed impressive corporate governance by reducing agency costs. Rashid (2016) stated that the interest payment obligation could minimize the agency costs when a company relies on debt financing.

Singh & Davidson (2003), on the other hand, claimed that leverage is inversely associated with the asset turnover ratio. According to Garanina & Kaikova (2016), higher debt is associated with lower agency costs in US firms, but higher debt raises agency costs in Norwegian firms.

Hypothesis 7 (H7): There is a negative relationship between leverage and agency costs.

Firm Size

Bigger firms usually have lower agency costs. Nguyen et al. (2020) claimed that firm size has a positive correlation with asset turnover and a negative correlation with agency costs. This finding is in line with those of Ang al. (2000) and Guillen (2017). According to Garanina & Kaikova (2016), larger Russian companies experience lower agency costs. This can be explained by the fact that large companies in Russia have well-developed corporate governance systems.

In contrast, bigger firms also have higher agency costs. Using data from 1027 UK companies between 1998 and 2000, Doukas et al. (2005) discovered that larger firms are prone to more information asymmetries than smaller firms, resulting in higher agency costs. They also claimed that larger companies are expected to have higher agency costs because they are more diverse and have more comprehensive organizational structures, which is in line with Henry (2007) that larger corporations are more exposed to agency problems.

Hypothesis 8 (H8):

(A) There is a positive relationship between firm size and agency costs.

(B) There is a negative relationship between firm size and agency costs.

Research Methodology

Sample Selection and Data Collection

The study examines the impact of board characteristics, firm characteristics and ownership structure on agency costs of listed Bangladeshi financial institutions. A sample of 21 financial institutions for the year 2017 to 2020, listed in the Dhaka Stock Exchange (DSE), has been chosen to conduct this study. Currently, there are 23 financial institutions listed in DSE. Two companies were not considered due to unavailability of annual reports. The sample size was narrowed down to 21 companies for a period of four years, obtaining 84 firm years. However, a few more annual reports were not available and the final sample size was reduced to 81 firm years. All data were collected from secondary sources, primarily from annual reports. Annual reports were collected from the websites of particular companies. Table 1 provides the list of selected companies taken for the study.

Table 1: List of Sample Companies

| Name of the Company | Name of the Company |
|---|--|
| Bay Leasing & Investment Limited | 12. Islamic Finance & Investment Ltd. |
| Bangladesh Finance Limited | 13. LankaBangla Finance Ltd. |
| Bangladesh Industrial Fin. Co. Ltd. | 14. MIDAS Financing Ltd. |
| Delta Brac Housing Finance Corp. Ltd. | 15. National Housing Fin. and Inv. Ltd. |
| FAS Finance & Investment Limited | 16. Phoenix Finance and Investments Ltd. |
| First Finance Limited | 17. Premier Leasing & Finance Limited |
| GSP Finance Company (Bangladesh) Limited | 18. Prime Finance & Investment Ltd. |
| Investment Corporation Of Bangladesh | 19. Union Capital Limited |
| IDLC Finance Ltd. | 20. United Finance Limited |
| International Leasing & Financial Services Ltd. | 21. Uttara Finance and Investments Limited |
| IPDC Finance Limited | |

Research Model

A pooled cross-sectional method is used to carry out this study. The hypotheses are checked using an ordinary least square (OLS) regression equation. In accordance with studies that have been carried out by (Ain et al., 2020; Rashid, 2016; Crutchley et al., 1999), the following regression equation has been drawn:

$$AUR = \alpha + \beta_1 LNBDSZ + \beta_2 INDDIR + \beta_3 FMLDIR + \beta_4 MANOWN + \beta_5 INSOWN + \beta_6 FOROWN + \beta_7 LEV + \beta_8 LNFSIZE + \varepsilon \quad (1)$$

$$ER = \alpha + \beta_1 LNBDSZ + \beta_2 INDDIR + \beta_3 FMLDIR + \beta_4 MANOWN + \beta_5 INSOWN + \beta_6 FOROWN + \beta_7 LEV + \beta_8 LNFSIZE + \varepsilon \quad (2)$$

In this paper, the above two equations are used to estimate the level of agency costs of the sample firms: The first is the Asset Utilization Ratio (AUR), and the second is the Expense Ratio (ER). In previous studies, these were frequently used to measure agency costs (Ain et al., 2020; Garanina & Kaikova, 2016; Rashid, 2016; Gul et al., 2012). Table 2 presents the descriptions of all variables used in the equation.

Table 2: Description of Variables

| Variable Name | Symbol | Explanation | Expected Correlation with Asset Utilization Ratio | Expected Correlation with Expense Ratio |
|---|---------|---|---|---|
| Agency Cost (Dependent Variable) | | | | |
| Asset Utilization Ratio | AUR | Ratio of Total Revenue to Total Assets | | |
| Expense Ratio | ER | Ratio of Total Operating Expense to Total Revenue | | |
| Independent Variables | | | | |
| Board Size | LNBDSZ | Natural Logarithm of Board Size | +/- | +/- |
| Independent Director | INDDIR | Percentage of Independent directors in board | + | - |
| Female Director | FMLDIR | Percentage of Female directors in board | + | - |
| Managerial Ownership | MANOWN | Percentage of Managerial Ownership | + | - |
| Institutional Ownership | INSOWN | Percentage of Institutional Ownership | + | - |
| Foreign Ownership | FOROWN | Percentage of Foreign Ownership | + | - |
| Leverage | LEV | Ratio of Total Debt to Total Assets | + | - |
| Firm Size | LNFSIZE | Natural Logarithm of Firm Size | +/- | +/- |

Findings and Analysis

Descriptive Statistics

The descriptive statistics for the dependent and independent variables are shown in Table 3. The mean, standard deviation, minimum, and maximum are included in descriptive statistics. The average firm agency cost in terms of the ER is 16 percent and the average firm agency cost in terms of the AUR is 9 percent, according to the descriptive statistics.

Table 3: Descriptive Statistics

| Variable Name | Obs. | Mean | Std. Dev. | Min | Max |
|-----------------------------|------|-------|-----------|------|--------|
| Asset Utilization Ratio | 81 | 9 | 3 | -5 | 14 |
| Expense Ratio | 81 | 16 | 19 | -8 | 137 |
| Board Size | 81 | 10 | 1 | 5 | 14 |
| Independent Directors (%) | 81 | 35 | 14 | 0 | 80 |
| Female Director (%) | 81 | 14 | 10 | 0 | 38 |
| Managerial Ownership (%) | 81 | 42 | 13 | 13 | 70 |
| Institutional Ownership (%) | 81 | 22 | 11 | 0 | 46 |
| Foreign Ownership (%) | 81 | 4 | 9 | 0 | 43 |
| Leverage | 81 | 91 | 19 | 67 | 183 |
| Firm Size | 81 | 38147 | 39766 | 9216 | 185357 |

The result also shows that the average board size is 10 with a range from 5 to 14 directors. The proportion of independent directors is 35 percent, ranging from 0 to 80 percent. Female director is 14 percent on average, with a range of 0 to 38 percent. The average percentage of managerial stock ownership is 42 percent, ranging from 13 to 70 percent. Institutional ownership is 22 percent on average, with a range of 0 to 46 percent. Foreign ownership is 4 percent on average, with a range of 0 to 43 percent. Leverage has a mean value of 91 percent with a minimum of 67 percent and a maximum of 183 percent. Firm size has a mean value of BDT 38,147 million ranging from BDT 9216 to BDT 185,357 million.

Bivariate Analysis

The correlation matrix is shown in Table 4. The matrix reveals that six independent variables, except the proportion of independent director and managerial ownership, are positively correlated with Asset Utilization Ratio (AUR). However, only the relationship between leverage and independent directors with AUR is found statistically significant.

Table 4: Correlation Matrix

| | aur | er | lnbdsz | inddir | fmldir | manown | insown | forown | lev | lnfsize |
|---------|----------|----------|--------|----------|----------|----------|----------|--------|--------|---------|
| aur | 1 | | | | | | | | | |
| er | -0.483** | 1 | | | | | | | | |
| lnbdsz | 0.153 | -0.260* | 1 | | | | | | | |
| inddir | -0.320** | 0.352** | -0.216 | 1 | | | | | | |
| fmldir | 0.107 | -0.256* | 0.07 | 0.062 | 1 | | | | | |
| manown | -0.002 | 0.06 | 0.194 | -0.537** | -0.386** | 1 | | | | |
| insown | 0.135 | -0.278* | 0.047 | 0.406** | 0.305** | -0.522** | 1 | | | |
| forown | 0.164 | -0.111 | 0.028 | 0.036 | 0.092 | 0.155 | -0.448** | 1 | | |
| lev | 0.677** | -0.573** | -0.04 | 0.374** | -0.166 | -0.124 | 0.317** | -0.059 | 1 | |
| lnfsize | 0.109 | -0.199 | 0.075 | -0.512** | 0.002 | 0.433** | -0.342** | 0.249* | -0.028 | 1 |

*p < 0.05, **p < 0.01

On the other hand, the proportion of independent directors and managerial ownership is positively correlated with Expense Ratio (ER) whereas all other six variables have a negative correlation. All these variables are found statistically significant to ER except the percentage of managerial ownership, foreign ownership and firm size.

The variance inflation factor (VIF) for the independent variables is shown in Table 5. The VIF test is used to see if there are any issues with multicollinearity among the variables in a regression model. The presence of a multicollinearity problem is recognized if the mean VIF is greater than 10 (Neter et al., 1989). On the other hand, if the mean VIF is less than 1, the regression equation could be biased (Bowerman & O'Connell, 1990). The mean VIF in this study is 1.76, implying that there is no multicollinearity problem or bias. It is consistent with the findings of (Sobhan, 2021).

Table 5: Variance Inflation Factor (VIF)

| Variable | Symbol | VIF | 1/VIF |
|-----------------------------|---------|------|---------|
| Institutional Ownership (%) | insown | 1.14 | 0.87642 |
| Independent Directors (%) | inddir | 2.27 | 0.43959 |
| Firm Size (ln) | lnfsize | 1.54 | 0.64867 |
| Managerial Ownership (%) | manown | 2.07 | 0.48313 |
| Foreign Ownership (%) | forown | 2.32 | 0.43091 |
| Female Director (%) | fmldir | 1.61 | 0.62041 |
| Leverage | lev | 1.44 | 0.69508 |
| Board Size (ln) | lnbdsz | 1.68 | 0.59459 |
| Mean VIF | | 1.76 | |

Regression Analysis

Table 6 shows the outcome of the regression analysis. As a proxy for agency costs, the Asset Utilization Ratio (AUR) and Expense Ratio (ER) are used. Therefore, a positive correlation with AUR implies fewer agency problems, while a positive correlation with ER indicates greater agency conflicts. The results above indicate that there is no significant relationship found among independent directors, female directors and firm size, with both the models.

Table 6: Regression Output with OLS Model

| Variable | Symbol | Model-1 (AUR) | Model-2 (ER) |
|-----------------------------|---------|---------------|--------------|
| Board Size (ln) | LNBDSZ | 0.024 | -0.332*** |
| (p value) | | (0.268) | (0.005) |
| Independent Directors (%) | INDDIR | -0.047 | 0.09 |
| (p value) | | (0.271) | (0.485) |
| Female Director (%) | FMLDIR | -0.066 | -0.318 |
| (p value) | | (0.433) | (0.138) |
| Managerial Ownership (%) | MANOWN | -0.06*** | 0.292** |
| (p value) | | (0.007) | (0.013) |
| Institutional Ownership (%) | INSOWN | 0.074*** | -0.423* |
| (p value) | | (0.008) | (0.078) |
| Foreign Ownership (%) | FOROWN | 0.091*** | 0.108 |
| (p value) | | (0.000) | (0.544) |
| Leverage | LEV | 0.113*** | -0.443* |
| (p value) | | (0.000) | (0.086) |
| Firm Size (ln) | LNFSIZE | 0.004 | -0.034 |
| (p value) | | (0.311) | (0.148) |
| R Squared | | 0.5738 | 0.5758 |
| Observations | | 81 | 81 |

*p < 0.10, **p < 0.05, ***p < 0.01

According to the regression result, a positive and insignificant relationship between board size and AUR in Model-1 and a negative and significant relationship with ER in model-2 is found in the study. Therefore, Hypothesis-1 (B) can be accepted. This evidence supports the findings of Junwei et al. (2011), Fauzi & Locke (2012), Florackis (2008), and Nguyen et al. (2020). It implies that larger boards can help lower agency costs by providing stronger supervision and control, enhancing board independence, and counteracting managerial entrenchment.

The study found managerial ownership has a significant relationship with AUR and ER in both models. It is negatively related to AUR and positively related to ER, which does not support Hypothesis-4. However, it is consistent with the study of Nguyen et al. (2020) which also stated that there is a positive relationship between management

ownership and agency costs in the context of Vietnam. Managers in Bangladesh, like those in Vietnam who hold a large percentage of shares, misuse their position to favor themselves. They take advantage of using insider information, appoint relatives to different positions of the company, transfer projects to their relatives, and choose suppliers without consideration to earn a commission. As a result, a high level of management ownership is not contributing to the reduction of agency costs.

The findings show that institutional ownership has a significant relationship with both AUR and ER. It is positively related to AUR and negatively related to ER. The finding is in line with the results of Gul et al. (2012), Henry (2004), Crutchley et al. (1999) and Brickley et al. (1997), which also revealed that institutional ownership reduces agency costs in the financial institution industry. Institutional owners play a vital role in effectively supervising the company in the best interest of the shareholders, which in result reduce the agency costs. Thus, Hypothesis-5 is supported.

In addition, the study found a positive and significant relationship between foreign ownership and AUR but there is a positive and insignificant relationship with ER. So, Hypothesis-6 can be accepted for model-1, but cannot be accepted for model-2. It is not possible to properly determine the nature of this relationship.

Finally, when it comes to leverage, it can be seen that leverage has a significant positive relationship with AUR and a negative one with ER. So, it means Hypothesis-7 can be accepted. It is also consistent with some other studies and implies that the higher the leverage of the company the lower the agency costs are in the financial institution industry (Nguyen et al. 2020; Garanina & Kaikova, 2016; Ang et al., 2000). The reasons are that managers strive for the optimum results under debt pressure resulting in reduced agency problems and also the firms are effectively monitored by the lenders.

Conclusion

The study examines the determinants of agency costs on a sample of 21 selected financial institutions listed in the Dhaka Stock Exchange during the period 2017 to 2020. Asset utilization ratio and expense ratio were used as a proxy to measure agency cost. Eight factors- the size of the board and firm, the percentage of independent directors, female directors, managerial ownership, institutional ownership, foreign ownership, and leverage all were considered.

The results reveal that higher institutional ownership and leverage reduce the level of agency costs. Larger board size also reduces agency costs, as the variable board size has a significant negative correlation with the expense ratio. However, the higher the extent of managerial ownership the higher the agency costs are, despite the fact that most research has identified a negative relationship between managerial ownership and agency costs. Furthermore, results on foreign ownership were mixed because two distinct models provided two different results, making it impossible to determine the nature of the relationship. Independent directors, female directors and firm size, on the other hand, have no impact on agency costs.

This study has some limitations. First of all, the sample size for this study was only 62 firm years. A larger sample size would generate more accurate results. Secondly, only some selected variables were considered in the regression model. To get a broader view, other characteristics such as government ownership, audit committee, board meetings, etc. could be included. Thirdly, the Asset Utilization Ratio (AUR) and the Expense Ratio (ER) are the only measures that were used as a proxy to determine the agency costs as such costs are not directly measurable. It would be worthwhile to use additional measures such as operating ratio, Tobin's Q ratio, etc. that are also sources of agency costs. Finally, the study was based only on listed Bangladeshi financial institutions; financial institutions from other countries could also be taken into consideration.

Based on the findings of this study, some suggestions can be provided. First of all, as managerial ownership raises the agency cost it ought to be reduced so that managers would have less authority over decisions that benefit them. Secondly, independent directors do not have any significance in reducing agency costs. So, proper independence should be given to exercise their authority on the board which may result in lowering the agency costs. Finally, effective corporate governance should be adopted, along with increased monitoring, in order to help lower agency costs.

This study will open the door for further research in this field. Instead of focusing solely on financial institutions, future studies might include all other industries too. The impact of the variables used in this research on Return on Assets (ROA), Profitability, etc. could be determined in future studies. Comparisons could be shown among firms from Bangladesh and other South Asian Countries, or a global image analyzing firms from across the world could be demonstrated as well.

References

- Adams, R. B., & Ferreira, D. (2009). Women in the boardroom and their impact on governance and performance. *Journal of financial economics*, 94(2), 291-309.
- Ain, Q. U., Yuan, X., Javaid, H. M., Usman, M., & Haris, M. (2020). Female directors and agency costs: evidence from Chinese listed firms. *International Journal of Emerging Markets*, 16(8), 1604-1633.
- Ang, J. S., Cole, R. A., & Lin, J. W. (2000). Agency costs and ownership structure. *The Journal of Finance*, 55(1), 81-106.
- Aziz, T., Majeed, S., & Saleem, S. (2015). The impact of corporate governance mechanism on agency cost: an empirical evidence of Pakistani listed companies. *Business, Management and Economics Research*, 1(6), 79-91.
- Bathala, C. T., & Rao, R. P. (1995). The determinants of board composition: An agency theory perspective. *Managerial and decision economics*, 16(1), 59-69.
- Bowerman, B. L., & O'Connell, R. T. (1990). *Linear statistical models: An applied approach*. Boston : PWS-Kent Pub. Co.

- Brickley, J. A., Coles, J. L., & Jarrell, G. (1997). Leadership structure: Separating the CEO and chairman of the board. *Journal of Corporate Finance*, 3(3), 189-220.
- Čalopa, N. K., Kokotec, I. Đ., & Kokot, K. (2020). Impact of board size and ownership concentration on agency costs: evidence for Croatian companies. *Zbornik Radova Ekonomski Fakultet u Rijeka*, 38(2), 521-535.
- Carter, D. A., Simkins, B. J., & Simpson, W. G. (2003). Corporate governance, board diversity, and firm value. *Financial review*, 38(1), 33-53.
- Cheng, S., Evans, J. H., & Nagarajan, N. J. (2008). Board size and firm performance: the moderating effects of the market for corporate control. *Review of Quantitative Finance and Accounting*, 31(2), 121-145.
- Coles, J. L., Daniel, N. D., & Naveen, L. (2008). Boards: Does one size fit all? *Journal of financial economics*, 87(2), 329-356.
- Core, J. E., Holthausen, R. W., & Larcker, D. F. (1997). Corporate governance, CEO compensation, and firm performance. *CEO Compensation, and Firm Performance*.
- Crutchley, C. E., Jensen, M. R., Jahera Jr, J. S., & Raymond, J. E. (1999). Agency problems and the simultaneity of financial decision making: The role of institutional ownership. *International review of financial analysis*, 8(2), 177-197.
- Doukas, J., McKnight, P. J., & Pantzalis, C. (2005). Security analysis, agency costs, and UK firm characteristics. *International Review of Financial Analysis*, 14(5), 493-507.
- Fauzi, F., & Locke, S. (2012). Board structure, ownership structure and firm performance: A study of New Zealand listed-firms. *Asian Academy of Management Journal of Accounting and Finance*, 43-67.
- Florackis, C. (2008). Agency costs and corporate governance mechanisms: Evidence for UK firms. *International Journal of Managerial Finance*, 4(1), 37-59.
- Francoeur, C., Labelle, R., & Sinclair-Desgagné, B. (2008). Gender diversity in corporate governance and top management. *Journal of Business Ethics*, 81(1), 83-95.
- Garanina, T., & Kaikova, E. (2016). Corporate governance mechanisms and agency costs: cross-country analysis. *Corporate Governance: The International Journal of Business in Society*, 16(2), 347-360.
- Guillen, M. F. (2017). Business groups in emerging economies: A resource-based view. *Academy of Management Journal*, 43(3), 362-380.

- Gul, F. A., Srinidhi, B., & Ng, A. C. (2011). Does board gender diversity improve the informativeness of stock prices? *Journal of Accounting and Economics*, 51(3), 314-338.
- Henry, D. (2004). Corporate governance and ownership structure of target companies and the outcome of takeovers. *Pacific-Basin Finance Journal*, 12(4), 419-444.
- Henry, D. (2007). Agency costs, corporate governance and ownership structure: evidence from Australia. *Financial Management Association*, (pp. 17-20). Orlando.
- Jensen, M. C., & Meckling, W. H. (1976). Theory of the firm: Managerial behaviour, agency costs and ownership structure. *Journal of financial economics*, 3(4), 305-360.
- Junwei, W., Guiqin, L., & Ping, H. (2011). Study on the Relationship between Agency Costs and Governance Mechanisms: Evidence from China's A-share Listed Companies. *M&D Forum Studies*, 258-271.
- Jurkus, A. F., Park, J. C., & Woodard, L. S. (2011). Women in top management and agency costs. *Journal of Business Research*, 64(2), 180-186.
- Lu, S. L., & Li, Y. H. (n.d.). Effect of corporate governance on institutional investors' preferences: An empirical investigation in Taiwan. *Journal of Risk and Financial Management*, 12(1), 32.
- McKnight, P. J., & Weir, C. (2009). Agency costs, corporate governance mechanisms and ownership structure in large UK publicly quoted companies: A panel data analysis. *The quarterly review of economics and finance*, 49(2), 139-158.
- Monks, R., & Minow, N. (2009). Agency costs, corporate governance mechanisms and ownership structure in large UK publicly quoted companies: A panel data analysis. *The quarterly review of economics and finance*, 49(2), 139-158.
- Neter, J., Wasserman, W., & Kutner, M. H. (1989). *Applied Linear Regression Models*. Homewood: Richard D. Irwin, Inc.
- Nguyen, A. H., Doan, T., & Nguyen, L. H. (2020). Corporate governance and agency cost: Empirical evidence from Vietnam. *Journal of Risk and Financial Management*, 13(5), 103.
- Nguyen, T. T., Evans, E., & Lu, M. (2017). Independent directors, ownership concentration and firm performance in listed companies: Evidence from Vietnam. *Pacific Accounting Review*, 29(2), 204-226.
- Pletzer, J. L., Nikolova, R., Kedzior, K. K., & Voelpel, S. C. (2015). Does gender matter? Female representation on corporate boards and firm financial performance-a meta-analysis. *PloS One*, 10(6), 1-20.

- Rashid, A. (2016). Managerial ownership and agency cost: Evidence from Bangladesh. *Journal of Business Ethics*, 137(3), 609-621.
- Sehrawat, N. K., Kumar, A., Lohia, N., Bansal, S., & Agarwal, T. (2019). Impact of Corporate Governance on Earnings Management: Large Sample Evidence from India. *Asian Economic and Financial Review*, 9(12), 1335.
- Singh, M., & Davidson, W. N. (2003). Agency costs, ownership structure and corporate governance mechanisms. *Journal of Banking & Finance*, 27(5), 793-816.
- Sobhan, R. (2021). Board Characteristics and Firm Performance: Evidence from the Listed Non-Banking Financial Institutions of Bangladesh. *International Journal of Management, Accounting and Economics*, 8(1), 25-41.
- Vijayakumaran, R. (2019). Agency costs, ownership, and internal governance mechanisms: Evidence from Chinese listed companies. *Asian Economic and Financial Review*, 9(1), 133-154.
- Vo, D. H., & Nguyen, T. M. (2014). The impact of corporate governance on firm performance: Empirical study in Vietnam. *International Journal of Economics and Finance*, 6(6), 1-13.
- Wellalage, N. H., & Locke, S. (2013). Women on board, firm financial performance and agency costs. *Asian Journal of Business Ethics*, 2(2), 113-127.
- Xu, X., & Wang, Y. (1999). Ownership structure and corporate governance in Chinese stock companies. *China Economic Review*, 10(1), 75-98.

COPYRIGHTS

©2022 The author(s). This is an open access article distributed under the terms of the Creative Commons Attribution (CC BY 4.0), which permits unrestricted use, distribution, and reproduction in any medium, as long as the original authors and source are cited. No permission is required from the authors or the publishers.



HOW TO CITE THIS ARTICLE

Sobhan, R., Chowdhury, M. (2022). Determinants of Agency Costs: Evidence from Non-Bank Financial Institutions of Bangladesh. *International Journal of Management, Accounting and Economics*, 9(2), 68-84.

DOI: 10.5281/zenodo.6613271

URL: https://www.ijmae.com/article_148961.html

